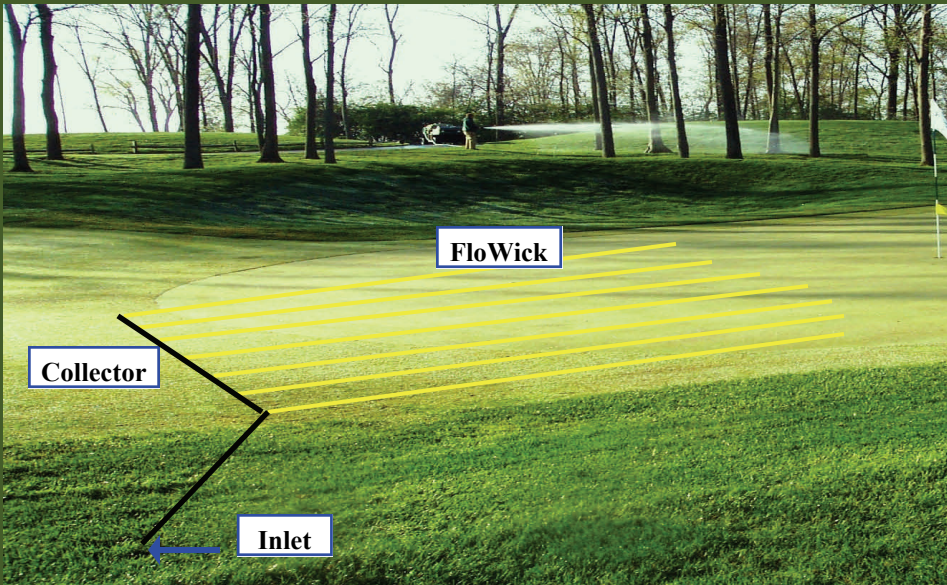


Passive Capillary Drain System removes water held in suspension in the saturated fringe of layered soils.

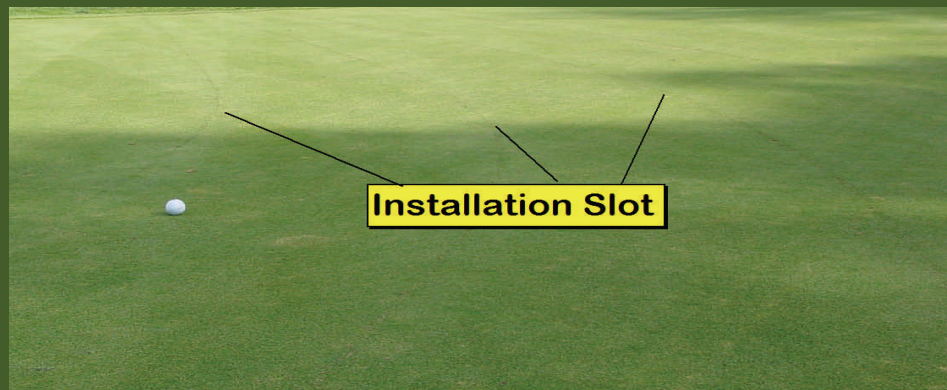


**FloWick™ system applied only in excess-moisture areas.**

The system consists of an array of wettable capillary elements that are both highly permeable and adsorptive; the element's adsorptive capacities help promote suction of moisture into the system, while the permeable properties are comparable to a fine gravel, assuring flow of the excess water to the exit collectors. As localized excess water is removed, soil moisture becomes more evenly distributed throughout the green. This aids in providing a consistent, denser turf stand for easier turf management, disease resistance, and improved playability.

**Sand Channels assure flow to elements.**

For push-up greens the capillary connection is made by installing the FloWick™ in the bottom of a continuous, subsurface sand curtain from the topdressing layer down to below the cup depth. Given a similarity in pore space between the sand channel and the FloWick™ elements, water normally held in the saturated fringe is now drawn into the gradient system for transport to collector exit drains.

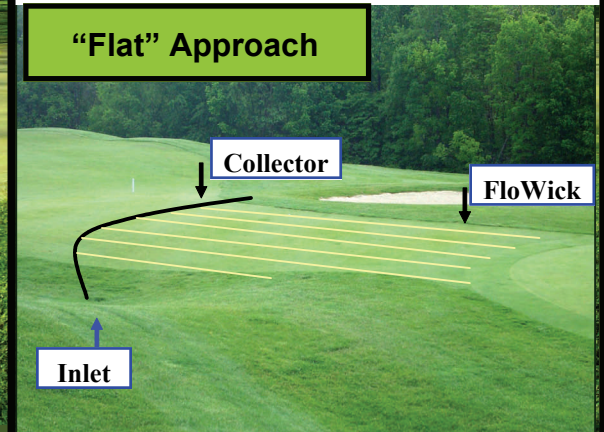


**Turf surface is playable immediately after installation.**

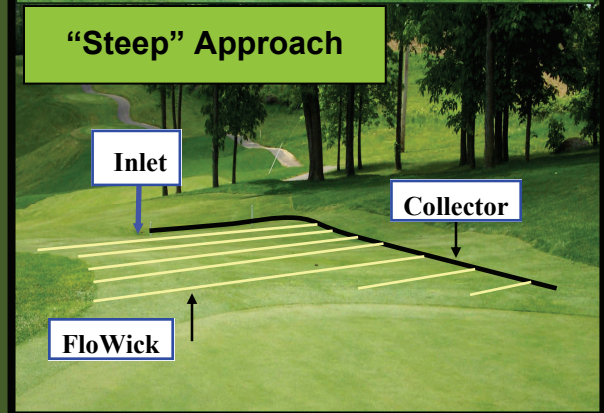
The FloWick™ installation process assures minimal surface disruption, saves the turf repair costs associated with alternative drainage methods.

Some design alternatives for wet areas in Approaches or Fairways.

**“Flat” Approach**



**“Steep” Approach**



**FloWick II with internal-core flow enabler that provides ten times the permeability of standard FloWick.**

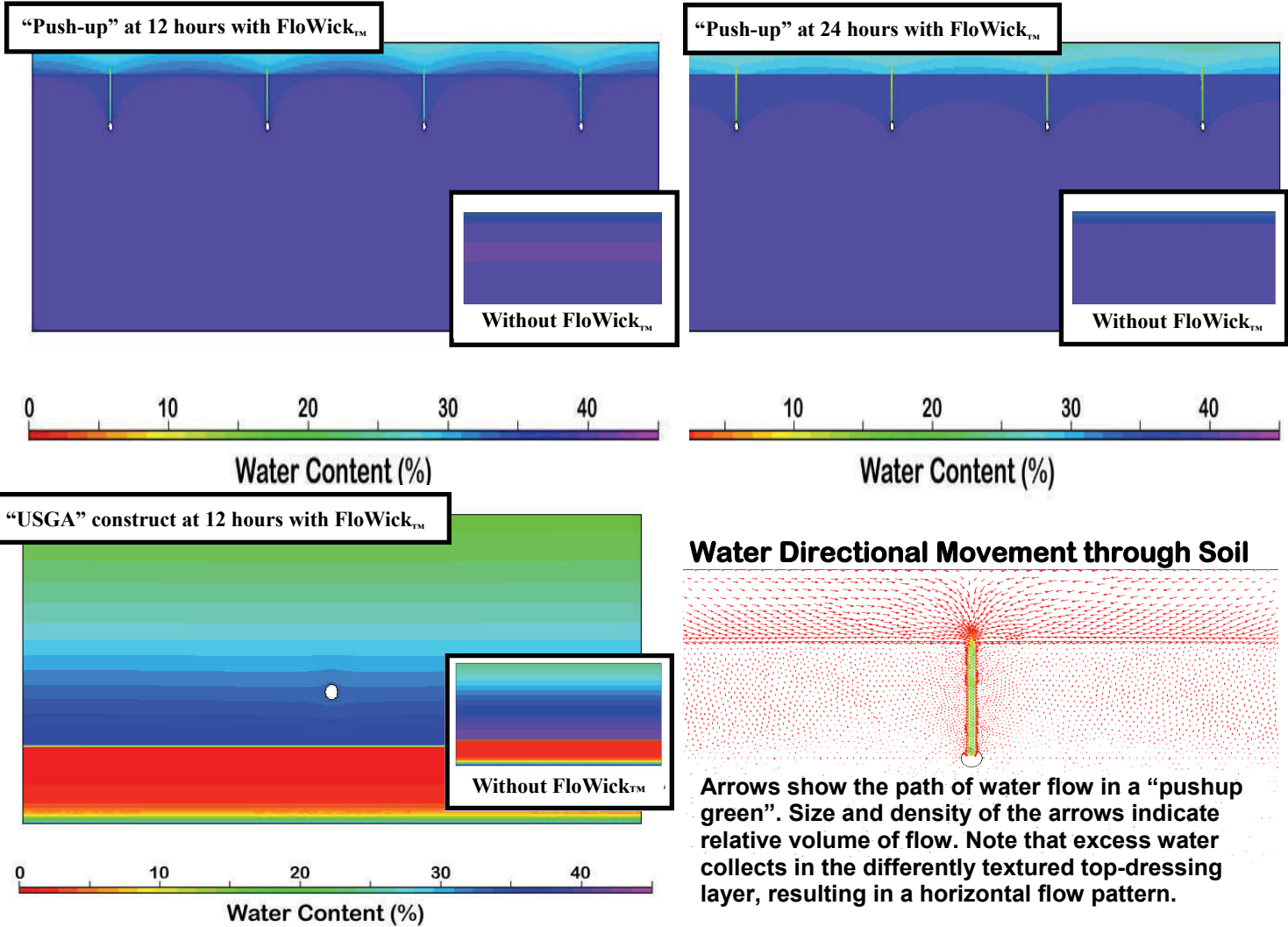
For use as collectors or for long-length interceptors on golf fairways, football fields and many other sports-turf drain systems. Also ideal for high-stress areas, where faster water removal is required.

**TURFTECH NOW™**

Healthy Turf Starts with Control of  
Nutrients Oxygen Water

**Timed moisture release shows dramatic results following a 1.3-inch soaking rain.**

Graphics below illustrate: 1) a push-up green's root zone cross section, 12 feet wide by 35 inches deep, with sand-curtain channels and FloWick™ lines installed 3-foot on center, from below cup depth up to topdressing interface, 2) a 3-foot wide USGA root zone cross section, 16 inches deep including the gravel blanket (no sand-curtain channels necessary or shown on the USGA construction). The color range shows soil moisture % over a 12-hour and a 24-hour sequence for the push-up green, and a 12-hour period for the USGA green, all following a 1.3-inch soaking rain. **The insets for each of the graphics depict moisture content without the FloWick™ system.**



**FloWick™ system helps the turf professional gain control of water within the green.** Provides the opportunity to develop a healthy turf requiring less maintenance. Turf with a deeper, denser, root system that resists biotic and abiotic stress. A turf for which problems such as moss invasion, algae, and black layer are all significantly reduced, if not eliminated. Chemical applications are minimized season after season as enhanced soil aeration increases microbial activity. When generally accepted maintenance practices for aeration and top-dressing are used in conjunction with this unique suction system, it will work continuously for the life of the green, eliminating excess capillary water without the use of electrical or mechanical devices. Also more affordable than alternative drain systems because it need only be applied on the low-side areas of the green.